

1(Twice Amended). A method for producing a foam comprising:

- (a) combining at least one liquid epoxy component with at least one acid source component, wherein said at least one acid source component comprises at least one hydrogen donating Lewis acid that is substantially water free, and at least one encapsulated blowing agent, under conditions sufficient to provide an exothermic reaction between said at least one liquid epoxy and at least one Lewis acid during said combining wherein an amount of heat is generated from said exothermic reaction that is sufficient to expand the combined components; and
- (b) utilizing heat from the exothermic reaction so as to expand the combined components to form a foam.

14(Three Times Amended). A foam precursor comprising:

- (a) an A-side foam precursor composition comprising at least one liquid epoxy compound, and at least one encapsulated blowing agent, and;
- (b) a B-side foam precursor composition comprising at least one acid source comprising about 1 to about 30wt.% of substantially water free phosphoric acid wherein said B-side foam precursor has an acidic pH .

21 (Twice Amended). A foam precursor comprising:

- (a) a A-side foam precursor composition comprising at least one liquid epoxy compound,
- (b) a B-side foam precursor composition comprising a combination comprising at least one polyol, at least one acid source comprising substantially water free phosphoric acid and having an acidic pH wherein said phosphoric acid comprises about 3 to about 15 wt.% of the B-side; and
- (c) at least one encapsulated blowing agent combined with at least one of said A or B side precursor.

24(Amended). A method for producing a foam comprising:

combining at least one liquid epoxy component, at least one acid source comprising phosphoric acid, and at least one encapsulated blowing agent wherein during said combining an exothermic reaction occurs when said at least one epoxy component and said at least one acid source are contacted that is sufficient to generate enough heat to expand the combined components,

dispensing the combined components into a containment device.

25(Amended). A method for producing a foam comprising:

combining an A-side foam precursor composition comprising at least one liquid epoxy compound, a B-side foam precursor composition comprising at least one acid source comprising phosphoric acid and having an acidic pH, and at least one encapsulated blowing agent, wherein said combining is performed under conditions sufficient to cause an exothermic reaction between at least one epoxy compound and said phosphoric acid that generates enough heat to expand said blowing agent during said combining, and

dispensing the combination into a containment device.

26(New). A method for producing a foam comprising:

providing an A-side foam precursor composition comprising at least one epoxy compound,

providing a B-side foam precursor composition comprising at least one acid source comprising phosphoric acid and having an acidic pH, wherein at least one encapsulated blowing agent is present in at least one of said A and B side foam precursors,

mixing the A-side and B-side foam precursors together wherein during said mixing an exothermic reaction occurs between said at least one epoxy compound and said phosphoric acid source and wherein the exothermic reaction generates an amount of heat sufficient to expand said encapsulated blowing agent, and;
using the heat to produce a foam.